

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/736,137	12/15/2003	Thomas E. Creamer	BOC9-2003-0093 (464)	3692
40987 7590 12/12/2007 AKERMAN SENTERFITT P. O. BOX 3188			EXAMINER	
			AHMED, SALMAN	
WEST PALM BEACH, FL 33402-3188			ART UNIT	PAPER NUMBER
			2619	
			MAIL DATE	DELIVERY MODE
			12/12/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

		c\
	Application No.	Applicant(s)
	10/736,137	CREAMER ET AL.
Office Action Summary	Examiner	Art Unit
	. Salman Ahmed	2619
The MAILING DATE of this communication a Period for Reply	ppears on the cover sheet wi	th the correspondence address
A SHORTENED STATUTORY PERIOD FOR REF WHICHEVER IS LONGER, FROM THE MAILING - Extensions of time may be available under the provisions of 37 CFR after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory perions are perions of the perion of the peri	DATE OF THIS COMMUNIC 1.136(a). In no event, however, may a re od will apply and will expire SIX (6) MON oute, cause the application to become AB	CATION. cply be timely filed IFHS from the mailing date of this communication. ANDONED (35 U.S.C. § 133).
Status		
Responsive to communication(s) filed on 9/2 2a) ☐ This action is FINAL. 2b) ☐ The solution of the sum o	nis action is non-final. vance except for formal matte	• •
Disposition of Claims		
4) ⊠ Claim(s) 1-21 is/are pending in the application 4a) Of the above claim(s) is/are withdress 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) 1-21 is/are rejected. 7) □ Claim(s) is/are objected to. 8) □ Claim(s) are subject to restriction and	rawn from consideration.	
Application Papers		•
9) The specification is objected to by the Exami 10) The drawing(s) filed on 12/15/2003 is/are: a) Applicant may not request that any objection to the Replacement drawing sheet(s) including the correction. The oath or declaration is objected to by the	D⊠ accepted or b) objectence drawing(s) be held in abeyant ection is required if the drawing(ce. See 37 CFR 1.85(a). s) is objected to. See 37 CFR 1.121(d).
Priority under 35 U.S.C. § 119		
 12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority docume 2. Certified copies of the priority docume 3. Copies of the certified copies of the priority application from the International Bure * See the attached detailed Office action for a life 	ents have been received. ents have been received in A riority documents have been eau (PCT Rule 17.2(a)).	oplication No received in this National Stage
		·
Attachment(s)	· .	
Notice of References Cited (PTO-892) Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	Paper No(s	ummary (PTO-413))/Mail Date iformal Patent Application

10/736,137 Art Unit: 2619

DETAILED ACTION

Claims 1-21 are pending.

Claims 1-21 are rejected.

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 3. Claims 1-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hicks III (US PAT PUB 2006/0019667) in view of Virtanen et al. (US PAT PUB 2002/0006797, hereinafter Virtanen).

In regards to claims 1, 8 and 15 Hicks teaches a method/means of roaming between mobile and wireless networks comprising: detecting a wireless network in

10/736,137

Art Unit: 2619

proximity to a mobile device (section 0101, the wireless access point 512 detects the dual mode telephone 106 entering the wireless network from the MAC broadcast by the dual mode telephone 106); querying the wireless network for an Internet Protocol address for the mobile device (section 0101, at block 808, the MAC address is obtained from the broadcast and an IP address is assigned to the handset having the MAC address. Depending upon the connectivity of the wireless access point to the wired data network, the IP address may be assigned at a local router or may be assigned at a remote router of the wired data network); receiving the Internet Protocol address (section 0101, at block 808, the MAC address is obtained from the broadcast and an IP address is assigned to the handset having the MAC address. Depending upon the connectivity of the wireless access point to the wired data network, the IP address may be assigned at a local router or may be assigned at a remote router of the wired data network); and sending a message via a mobile network for the mobile device to a mobile switching center of the mobile network (section 0104, at block 820, the dual mode telephone 106 sends a first message such as, for example, a short message service (SMS) message to the MSC 272 of the licensed wireless network 112 notifying the MSC 272 to route communications directed to the wireless number associated with the dual mode phone 106 to the wired data line number associated with the phone 106), wherein the message instructs the mobile switching center to route voice data intended for the mobile device to the Internet Protocol address via a communicatively linked gateway and the wireless network (section 0104, At block 824, when a communication directed to the wireless number associated with the dual mode phone 106 is received at

10/736,137 Art Unit: 2619

the MSC 272, a termination attempt trigger is generated at the MSC. In response thereto, a query is transmitted to the HSS 912 requesting further instructions on the handling of the incoming communication at block 826. Based on the content of the first message stored at the HSS 912, at block 828 the incoming communication is routed to the wired data line number associated with the dual mode phone 106 via the unlicensed wireless network 110 for VoIP communication, such as through the GMSC 250 and MGW 246 from the MSC 272).

In regards to claims 5, 7, 12, 14, 19 and 21 Hicks teaches method/means for communicating over a wireless network using a mobile device (section 0104, the user may send and receive subsequent calls on the dual mode telephone 106 via the cordless mode through the unlicensed wireless network 110), detecting that the mobile device is roaming outside a coverage area of the wireless network (section 0105, at block 834, the dual mode telephone 106 detects the loss of the unlicensed wireless network connectivity); and sending a message via a mobile network for the mobile device to a mobile switching center of the mobile network (section 0105, accordingly, the dual mode phone 106 sends a second message to the MSC 272 of the licensed wireless network 112 notifying the MSC 272 to route communications directed to the wireless number associated with the dual mode phone 106 to the wireless number at block 836), wherein the message instructs the mobile switching center to route voice data intended for the mobile device to the mobile device using at least one mobile voice channel of the mobile network (section 0105, when a communication directed to the wireless number associated with the dual mode phone 106 is received at the MSC 272,

10/736,137 Art Unit: 2619

a termination attempt trigger is generated at the MSC 272. In response thereto, a query

is transmitted to the HSS 912 requesting further instructions on the handling of the

incoming communication. Based on the content of the second message stored at the

HSS 912, the incoming communication is routed to the wireless number associated with

the dual mode phone 106 via the licensed wireless network 112 for wireless (mobile)

communication).

Hicks does not explicitly teach message being send via control channel.

Virtanen in the same field of endeavor teaches message being send via control

channel (section 0069, if, in step 901, the MS finds out that a call is going on, it delivers

in step 911 the SM via control channels related to that call).

It would have been obvious to one having ordinary skill in the art at the time the

invention was made to modify Hicks' system/method by incorporating the steps of

message being sent via control channel as suggested by Virtanen. The motivation is

that, by utilizing the less used control channel for transmitting messages, a system can

efficiently utilize available bandwidth; thus making more efficient usage of network

resources.

In regards to claims 5, 7, 12, 14, 19 and 21 Hicks and Virtanen do not explicitly

teach transmitting voice using voice channel.

It would have been obvious to one having ordinary skill in the art at the time the

invention was made to modify Hicks and Virtanen's system/method by incorporating the

steps of transmitting voice using voice channel, as voice channels are designated in a

10/736,137

Art Unit: 2619

wireless network to efficiently and reliably transmit voice signals for implementing successful voice communication.

In regards to claims 15 and 19 Hicks teaches a machine readable storage, having stored thereon a computer program having a plurality of code sections executable by a machine (Figure 2, digital cordless telephone or handset 104 has memory, processor/controller/dsp and program associated with it).

In regards to claims 2, 9 and 16 Hicks teaches receiving voice data from the gateway via the wireless network (section 0104).

In regards to claims 3, 10 and 17 Hicks teaches configuring the mobile switching center to route voice data intended for the mobile device to the Internet Protocol address via the communicatively linked gateway and the wireless network (section 0104).

In regards to claims 4, 11 and 18 Hicks teaches prior to detecting step, the mobile device is in communication with a different wireless network (section 0100).

In regards to claims 6, 13 and 20 Hicks teaches receiving voice data from the mobile switching center via the mobile network (section 0105).

Response to Arguments

4. Applicant's arguments see pages 7-13 of the Remarks section, filed 9/28/2007, with respect to the rejections to the claims have been fully considered. Applicant has amended independent claims 1, 5, 8, 12, 15 and 19. Applicant's amendment

10/736,137 Art Unit: 2619

necessitated a new ground of rejections presented in this office action. As such any further response to Applicant's argument is moot.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Salman Ahmed whose telephone number is (571) 272-8307. The examiner can normally be reached on 8:00 am - 4:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edan Orgad can be reached on (571) 272-7884. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

10/736,137 Art Unit: 2619

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Salman Ahmed Patent Examiner Art Unit 2619

SA 11/26/2007

> EDAN . ORGAD SUPERVISORY PATENT EXAMINER